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The Financial Position of Universities in Ontario: 1987

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THE FINANCIAL POSITION OF ONTARIO UNIVERSITIES: 1987

This report on the financial position of Ontario universities continues a pattern of analysis which has been developed over many years by the Council of Ontario Universities. It reviews trends over time and makes comparisons among different sectors in Ontario and with other jurisdictions to help determine the adequacy of funding levels available to universities in this province. Wherever possible, the most current data available have been used.

Figure 1 and Table 1 permit some assessment of the level of funding of Ontario universities relative to that provided to other sectors supported by the provincial government. While universities and colleges have seen their expenditure per student reduced by about 15% since 1977-78, costs per patient day in hospitals and per student in elementary and secondary schools have increased by about 15%. The position of colleges and universities was at its worst in 1982-83 but they have enjoyed some modest improvement since then.

Figure 2 and Table 2 show that, in every year of the past decade, operating grants to universities have increased more slowly than has total provincial government budgetary expenditure. As a result, the proportion of provincial budgetary expenditure going to university operating grants declined in every year (Table 3). If Ontario universities were currently receiving the same share of provincial spending as they did in 1977-78, a further $300 million per year in university operating grants would be required.

Figure 3 and Table 4 indicate that while government expenditures have

grown at roughly the same rate as the economy as a whole, as measured by growth in the Gross Provincial Product, the same cannot be said of grants to universities. They have expanded at a much slower rate than the economy such that the share of Ontario's GPP represented by operating grants to universities is about 19% below what it was in 1977-78.

Figure 4 and Table 5 indicate that operating grants to Ontario universities per full-time equivalent student have been below the national average throughout the past ten years. In recent years, however, the gap between Ontario and the rest of the country has narrowed considerably, in part because of improved funding in Ontario but largely as a result of a severe deterioration in university support in other parts of Canada. Table 6 displays operating grants to universities per $1,000 of provincial personal income. Using this indicator, Ontario has ranked tenth among all the provinces in every year since 1977-78.

Figure 5 and Table 7 compare rates of growth of operating grants to universities with rates of growth of each province's economy. In the period between 1977-78 and 1981-82, operating grants to universities in Ontario grew about half as fast as the rate of growth of the provincial gross domestic product. But while this rate of growth, relative to the GDP, increased significantly in Ontario in the period after 1981-82, in many other provinces the rate of growth of support for universities deteriorated. For example, in British Columbia there was hardly any growth at all in the size of grants to its universities relative to the growth in GDP. Overall, between 1977-78 and 1984-85, no province increased its grants to universities at a rate as fast as its general

economic growth. But Ontario ranked eighth among all the provinces in this regard.

Figure 6 compares the growth in state appropriations for higher education per student in the United States with the growth in operating grants per student to universities in Canada. While decreases in university support in the U.S. were similar to those in Canada in the late 1970s and early 1980s, the picture changed dramatically in the U.S. in the years subsequent to 1982-83. Between 1982-83 and 1985-86, the constant dollar value of operating grants to Ontario universities for each full-time equivalent student increased by 1%. As Figure 7 demonstrates, the comparable figure for the average American state was 18%. In California, the increase was 36%, in Ohio 33%, in Michigan 31%, and in New York 22%.

Table 8 indicates that universities in Ontario rely more heavily on non-grant sources of revenue than do all but one of the other jurisdictions in Canada. In 1984-85, Ontario universities derived 18.4% of their operating income from tuition fees. Universities in the other nine provinces derived 11.4% of their income from fees. Table 9 demonstrates that provincial grant income in Ontario represents 55.1% of total revenue. The comparable figure for the rest of Canada is 66.0%. A significant part of this difference is attributable to the large volume of research activity at Ontario universities. Because research grants, generally, do not provide for overhead costs, the growth in research activity over the past decade has placed a considerable strain on university operating budgets. Table 10 demonstrates that, between 1977-78 and 1985-86, the constant dollar value of sponsored research activity

increased by 50% while operating expenses remained relatively constant.

Table 11 indicates that university salary expenditure in constant dollars per full-time equivalent student has declined by about 17% in the period between 1977-78 and 1985-86. The costs of employee benefits are shown in Table 12. The constant dollar cost of statutory benefits has increased by 37% between 1977-78 and 1986-87, with the cost of unemployment insurance and workers' compensation doubling. Over the same period, the cost of non-statutory benefits has increased by only 10%. Figure 8 demonstrates the degree to which the cost of benefits has increased as a percentage of salaries and compares costs with those experienced by the Ontario government.

Non-salary costs have also presented some particular problems to universities. Table 13 and Figure 9 compare the rate of change in prices universities pay for non-salary items with the rate of change in the consumer price index. In almost every year since the Ontario University Non-Salary Price Index was developed, it has increased by more than the CPI (see also the Appendix).

An obvious example of major cost pressure in the non-salary area is for the purchase of books and periodicals for university libraries. Figure 10 and Table 14 show a 32% decline in the value of library acquisitions per student in the years between 1977-78 and 1985-86. This has occurred even though universities continue to spend about the same proportion of their total budgets on library acquisitions. But the price of library acquisitions increased about twice as fast as the CPI with the result that the purchasing power of library budgets was significantly reduced.

Figure 11 and Table 15 display a twenty year history of capital funding

for Ontario universities in actual and constant dollar terms. Capital expenditure in 1986-87 is about one-tenth the level it was at in the early 1970s. Table 16 examines total expenditure by universities on buildings, land and site services throughout Canada. Ontario's expenditure per full-time equivalent student was $120. The average for the rest of Canada was $437.

The deteriorating financial position of Ontario universities, through most of the 1970's and at least the first half of the 1980's, does not appear to result from the economic situation in Ontario or the financial position of the Ontario government. Certainly, by comparison with what is occurring in other provinces, the economic strength of Ontario is not being utilized to the same extent in support of higher education. Table 17 indicates that the Ontario government's total revenues per capita, as a percentage of gross domestic product, and as a percentage of provincial personal income are the lowest of any province in Canada. Even when federal transfer payments are excluded and local government revenues are included (Table 18), these significant differences are sustained. Table 19 suggests that while Ontario has the second highest tax base or tax capacity per capita of any province in the country, the provincial government's tax revenue per capita is the lowest of any province outside of Atlantic Canada. Ontario's tax effort, when adjusted for the size of each province's surplus or deficit, is now the lowest in the country.

The Ontario government's financial position is such that it is able to finance its activities without running an operating deficit. As Table 20 demonstrates, in most years the Ontario government's capital

expenditures exceeded either its net cash requirements or its net borrowings. In other words, Ontario has been able to pay all of its operating expenses plus some of its capital expenses out of revenues. Borrowings from the Canada Pension Plan and the Teachers' Superannuation Fund have been used to cover the remainder of the capital expenses. In 1986-87, it appears that Ontario will have an operating surplus of about $1 billion and that this amount will cover almost half of its capital expenses.

All of the above should be judged within the context of the continuing economic importance of the university sector. Table 21 gives some hint of the economic benefits derived from university training. Unemployment rates among university graduates are about one third the level of those who did not go beyond high school. Participation rates, the likelihood of someone being in the labour force, are over twice as great for university graduates as for those with eight years or less of education.

The economic impact of universities is greatest in that sector which is both the largest and the fastest growing component of the economy, the service sector. As Table 22 demonstrates, according to the 1981 census, over 88% of university graduates worked in the service sector. Over 12% of the people employed within the service sector had degrees. The highest concentrations were in education, business management, government administration, health and welfare, and finance, insurance, and real estate.

FIGURES AND TABLES

Figure 1
INDEX OF EXPENDITURES PER CLIENT SERVED IN ONTARIO
1977–78 to 1985–86
(In Constant Dollars)

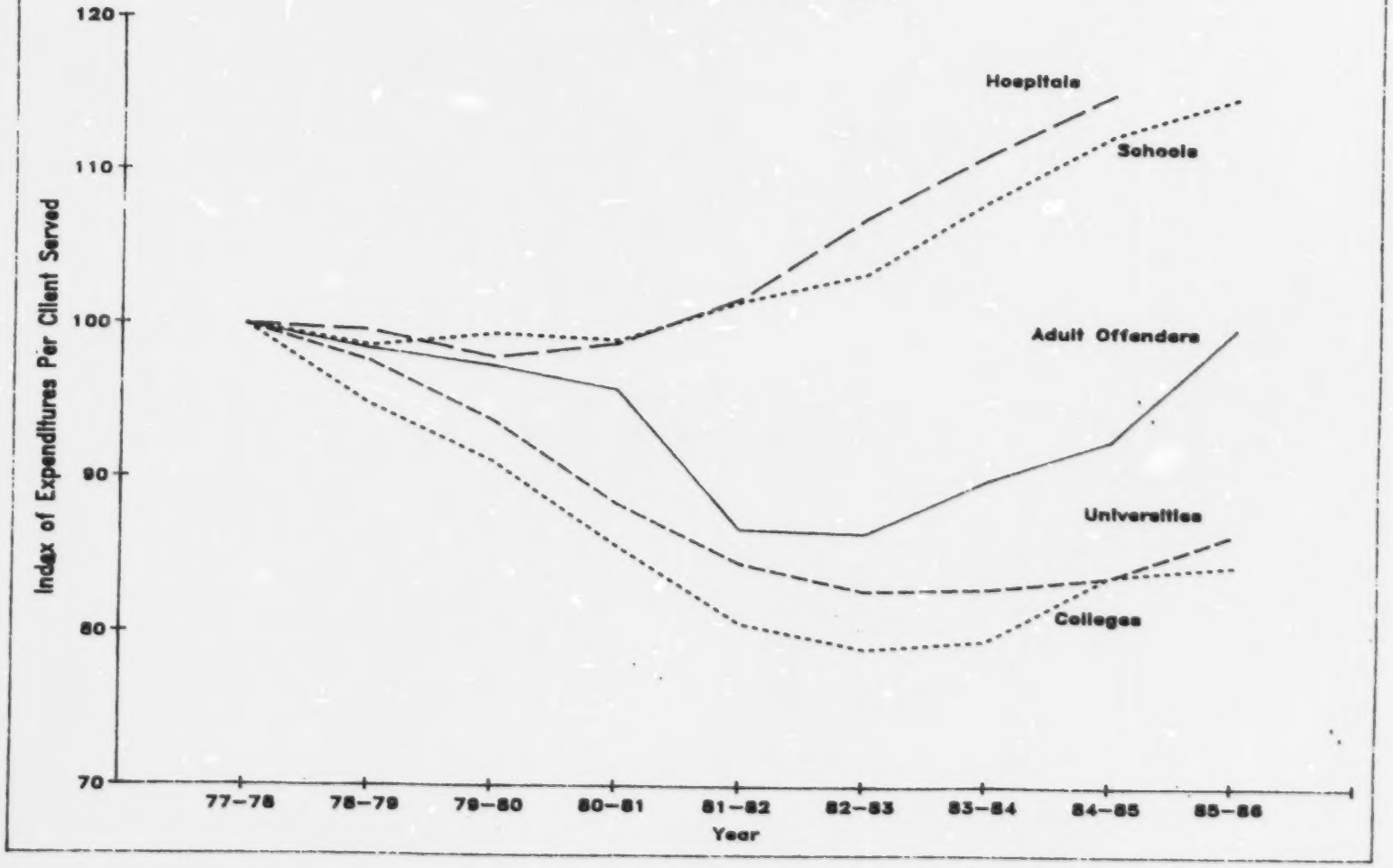


Table 1

Expenditures per Client Served, 1977-78 to 1985-86

		1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86
Elementary & Secondary Education (total school costs per pupil)1	Actual	$ 2,083	$ 2,240	$ 2,468	$ 2,735	$ 3,149	$ 3,504	$ 3,859	$ 4,168	$ 4,436p
	Constant	2,083	2,053	2,071	2,064	2,119	2,156	2,258	2,348	2,400
	Index	100.0	98.6	99.4	99.1	101.7	103.5	108.4	112.7	115.2
Hospitals (gross operating costs per diem)2	Actual	$151.91	$165.06	$177.19	$199.15	$230.06	$264.67	$289.52	$311.06	
	Constant	151.91	151.29	148.65	150.30	154.82	162.87	169.41	175.25	
	Index	100.0	99.6	97.9	98.9	101.9	107.2	111.5	115.4	
CAATs (operating cost per FTE student)3	Actual	$ 3,558	$ 3,679	$ 3,857	$4,035	$ 4,261	$ 4,567	$ 4,840	$ 5,100	$ 5,565p
	Constant	3,558	3,372	3,236	3,045	2,867	2,810	2,832	2,986	3,011
	Index	100.0	94.8	91.0	85.6	80.6	79.0	79.6	83.9	84.6
Adult Offenders (expenditure per inmate day)4	Actual	$ 47.50	$ 50.97	$ 55.09	$ 60.32	$ 61.22	$ 66.80	$ 73.16	$ 78.17	$ 87.83
	Constant	47.50	46.72	46.22	45.52	41.20	41.11	42.81	44.04	47.53
	Index	100.0	98.4	97.3	95.8	86.7	86.5	90.1	92.7	100.1
Universities (operating expense per FTE student)5	Actual	$ 4,723	$ 5,030	$ 5,277	$ 5,534	$ 5,929	$ 6,354	$ 6,697	$7,021	$ 7,557p
	Constant	4,723	4,610	4,427	4,176	3,990	3,910	3,918	3,956	4,089
	Index	100.0	97.6	93.7	88.4	84.5	82.8	83.0	83.8	86.6

p = preliminary

Sources:
1. Ministry of Education.
2. Ministry of Health, Hospital Statistics, various years.
3. Ministry of Colleges and Universities, Multi-Year Plan Analysis of the Colleges of Applied Arts and Technology, various years.
4. Ministry of Correctional Services.
5. Ministry of Colleges and Universities, MCU Financial Report, various years; COU Special Committee on Macro-Indicators Ontario Universities Statistical Compendium, various years; and Committee of Finance Officers - Universities of Ontario, Financial Report of Ontario Universities, various years.

Figure 2
VARIANCE BETWEEN GROWTH IN UNIVERSITY GRANTS
AND PROVINCIAL BUDGETARY EXPENDITURES
1977–78 to 1986–87

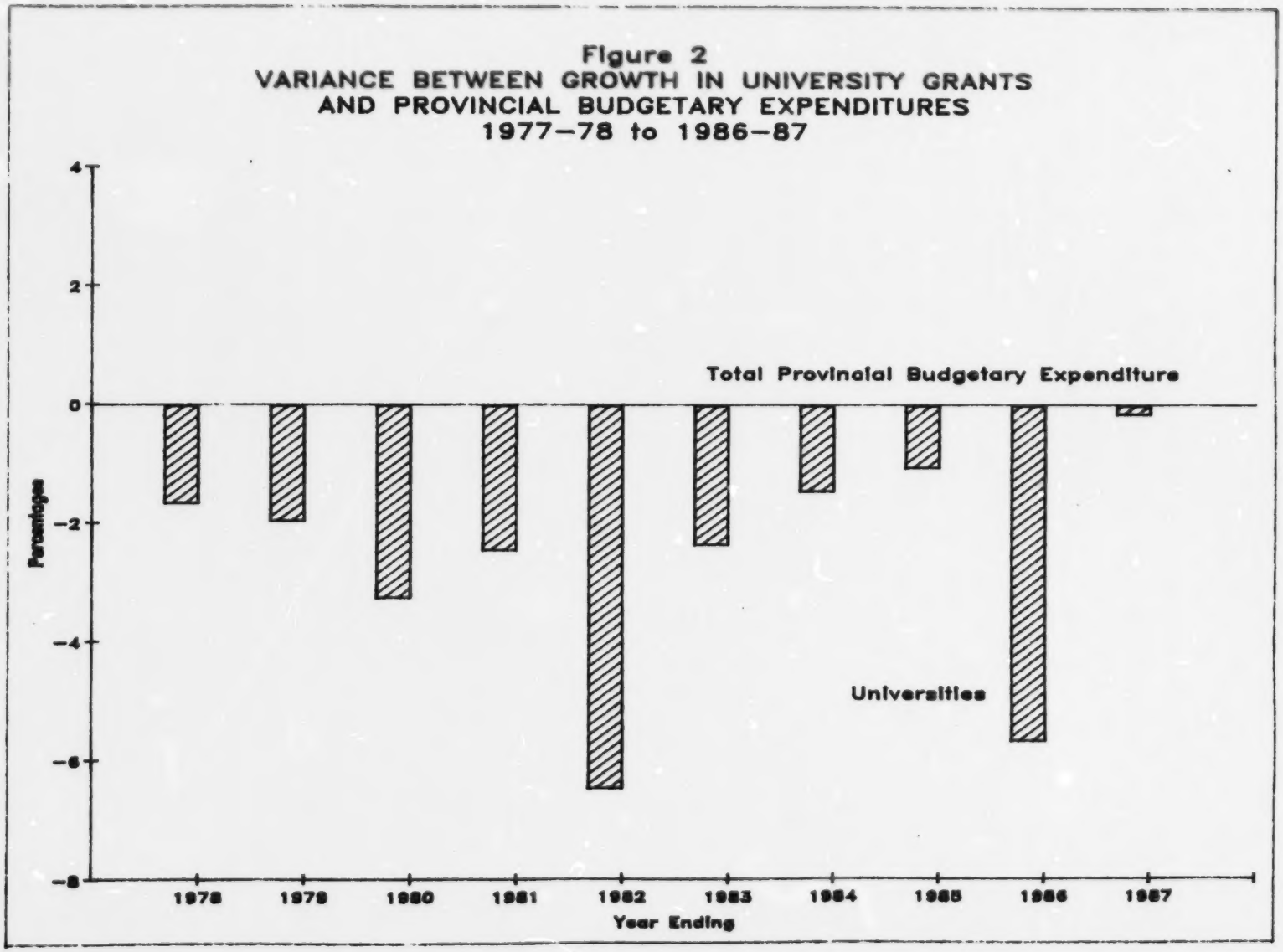


Table 2

Percentage Increase in Provincial Operating Grants and Total Budgetary Expenditures 1977-78 to 1986-87

	Operating Grants to Ontario Universities	Total Provincial Budgetary Expenditures	Universities Difference from Provincial Annual Increase
1977-78	8.4	10.1	(1.7)
1978-79	5.8	7.8	(2.0)
1979-80	5.1	8.4	(3.3)
1980-81	7.2	9.7	(2.5)
1981-82	10.2	16.7	(6.5)
1982-83	12.1	14.5	(2.4)
1983-84	7.5	9.0	(1.5)
1984-85	6.5	7.6	(1.1)
1985-86	5.1	10.8	(5.7)
1986-87(e)	8.3	8.5*	(0.2)
Average	7.6	10.3	(2.7)

Source: Province of Ontario, Public Accounts, various years.
Province of Ontario, Ontario Finances, Quarterly Update, December 31, 1986.

*Estimates of total provincial budgetary expenditure increases have been consistently understated. This has resulted in consistently underestimating the differences between increases in grants to universities, which do not change during the fiscal year, and increases in total provincial budgetary expenditures.

Table 3

Ontario Universities' Share of Provincial Budgetary Expenditures

(Excluding Public Debt Interest Payments)

	Universities' Share	Universities' Annual Shortfall from 1977-78 Level of Government Support	
	%	%	$ millions
1977-78	5.92	-	-
1978-79	5.87	0.87	4.1
1979-80	5.61	5.22	40.5
1980-81	5.50	7.09	61.1
1981-82	5.18	12.43	127.8
1982-83	5.08	14.22	167.8
1983-84	5.05	14.62	186.4
1984-85	5.04	14.86	202.3
1985-86	4.78	19.26	290.2
1986-87 (estimate)	4.77	19.43	317.5

Source: Ontario, Public Accounts, various years.
Ontario, Ontario Finances, Quarterly Update, December 31, 1986

Figure 3
GROWTH IN ONTARIO GPP, GOVERNMENT,
AND GRANTS TO UNIVERSITIES
1977–78 to 1986–87

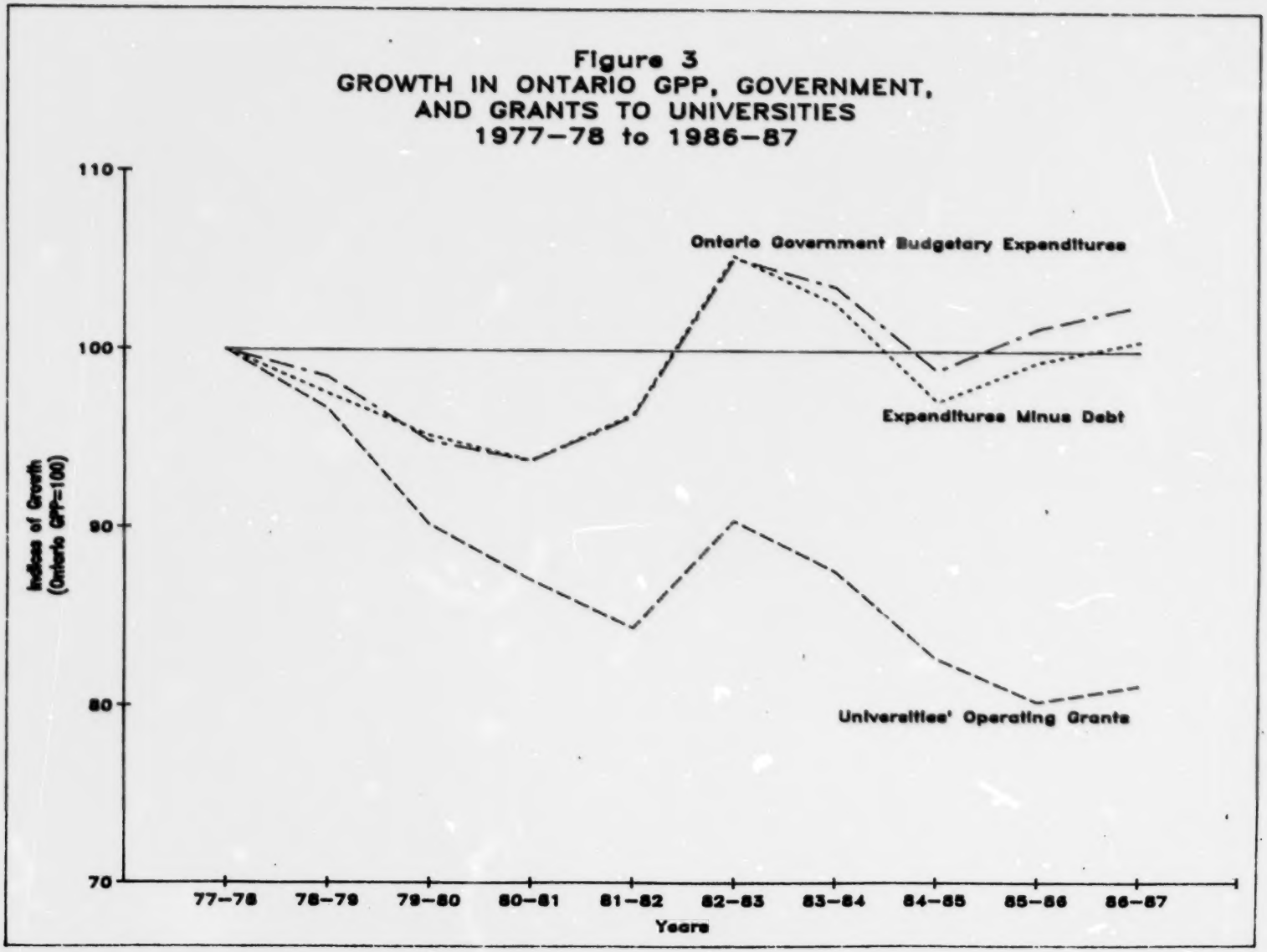


Table 4

Growth of Ontario GPP, Government and Grants to Universities

1977-78 to 1986-87

	GPP Index Values	Government Expenditures Index	Government Minus Debt Interest Index	Universities' Grants Index	Growth of Government vs. GPP	Government Minus Debt Interest vs. GPP	Growth of Universities' Grants vs. GPP
1977-78	100.0	100.0	100.0	100.0	100.0	100.0	100.0
1978-79	109.4	107.8	106.7	105.8	98.5	97.5	96.7
1979-80	123.2	116.9	117.3	111.1	94.9	95.2	90.2
1980-81	136.7	128.2	128.2	119.1	93.8	93.8	87.1
1981-82	155.4	149.7	149.9	131.3	96.3	96.4	84.4
1982-83	162.9	171.4	171.6	147.2	105.2	105.3	90.4
1983-84	180.6	187.0	185.2	158.2	103.6	102.6	87.6
1984-85	203.6	201.3	197.8	168.4	98.9	97.1	82.7
1985-86	220.3	223.1	218.9	176.9	101.3	99.4	80.3
1986-87	235.9	242.0	237.4	191.5	102.6	100.6	81.2

Note: The first four columns of information measure the growth of the economy (as measured by the Gross Provincial Product), the growth of provincial government expenditures, the growth of those same expenditures but excluding public debt interest payments, and the growth of operating grants to universities. The last three columns compare the rates of growth of goverment expenditures (including and excluding debt payments) and grants to universities with the rate of growth of the economy. That is, an index value of 100.0 indicates an identical growth rate to that of the GPP, a lesser value indicates a lower rate of growth, and a value greater than 100.0 indicates a growth rate greater than the growth rate of the GPP.

Sources: Public Accounts of Ontario, various years
Economic and Fiscal Review, Province of Ontario
Ontario Finances, December 31, 1986

Figure 4
OPERATING GRANTS TO UNIVERSITIES PER FTE STUDENT
1977–78 to 1986–87
(Constant 1986–87 Dollars)

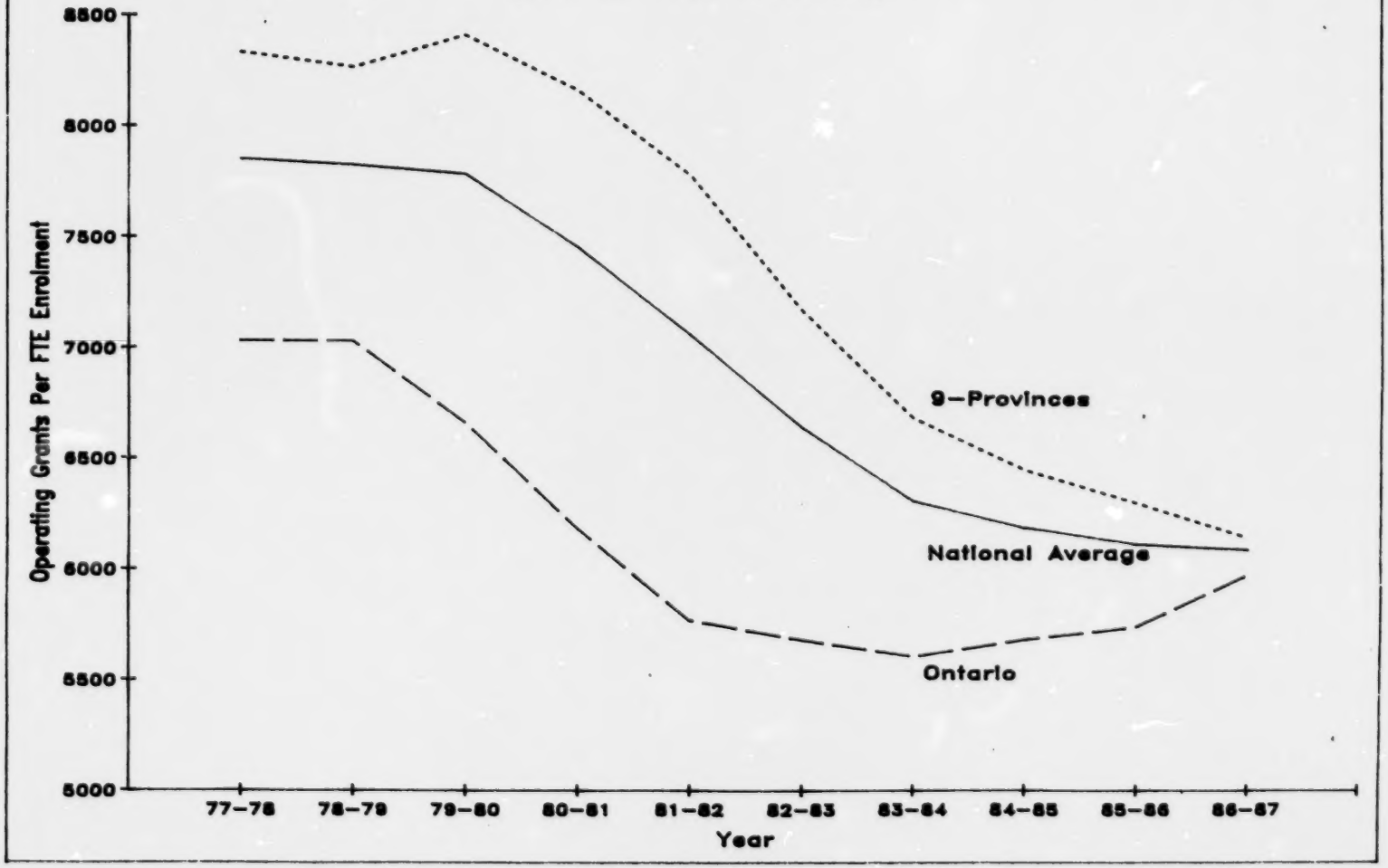


Table 5

Interprovincial Comparisons of Operating Grants to Universities

Per FTE Student 1977-78 to 1986-87

	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85e	1985-86e	1986-87e
British Columbia	$4,521 (3)	$5,025 (3)	$5,337 (3)	$5,683 (4)	$6,433 (2)	$6,402 (3)	$6,072 (4)	$5,900 (4)	$5,651 (6)	$5,928 (6)
Alberta	4,797 (1)	5,340 (2)	5,815 (2)	6,284 (1)	6,812 (1)	7,328 (1)	7,182 (2)	7,315 (1)	7,336 (1)	7,293 (1)
Saskatchewan	4,108 (5)	4,616 (5)	5,098 (5)	5,304 (5)	5,619 (5)	6,149 (4)	6,106 (3)	6,331 (3)	7,095 (2)	7,228 (2)
Manitoba	3,874 (7)	4,124 (7)	4,771 (6)	4,499 (7)	5,062 (6)	5,362 (6)	5,582 (6)	5,787 (5)	6,048 (4)	6,514 (3)
Quebec	4,449 (4)	4,657 (4)	5,299 (4)	5,935 (2)	6,176 (3)	5,915 (5)	5,713 (5)	5,702 (6)	5,865 (5)	5,836 (7)
New Brunswick	3,905 (6)	4,364 (6)	4,762 (7)	4,929 (6)	4,998 (7)	5,270 (7)	5,175 (7)	5,423 (7)	5,561 (7)	5,696 (8)
Nova Scotia	3,497 (9)	3,819 (9)	4,074(10)	4,379 (9)	4,908 (8)	5,079 (8)	5,154 (8)	5,326 (8)	5,407 (9)	5,318 (9)
Prince Edward Island	3,030(10)	3,544(10)	4,246 (8)	4,441 (8)	4,720 (9)	5,023 (9)	5,089 (9)	5,276 (9)	5,282(10)	5,147(10)
Newfoundland	4,625 (2)	5,485 (1)	5,994 (1)	5,684 (3)	5,847 (4)	6,912 (2)	7,788 (1)	6,837 (2)	6,545 (3)	6,126 (4)
9 Provinces	4,347 -	4,705 -	5,232 -	5,644 -	6,037 -	6,088 -	5,964 -	5,981 -	6,084 -	6,151 -
Ontario (Rank)	3,669 (8)	4,002 (8)	4,140 (9)	4,273(10)	4,475(10)	4,821(10)	5,000(10)	5,272 (10)	5,544 (8)	5,982 (5)
Canada	$4,097 -	$4,455 -	$4,840 -	$5,155 -	$5,480 -	$5,639 -	$5,629 -	$5,737 -	5,902 -	6,097 -

e = estimate

Source: Tripartite Committee on Interprovincial Comparisons, April 1986, for actual data. COU Research Division for estimates.

Table 6

Provincial Operating Grants for Universities

Per $1,000 of Provincial Personal Income

	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85e	Rank 1984-85
British Columbia	$ 10.70	$ 10.57	$ 9.91	$ 9.41	$ 9.39	$ 9.24	$ 8.70	$ 7.91	(9)
Alberta	13.97	13.10	11.87	10.90	10.26	11.04	11.26	11.32	(5)
Saskatchewan	12.09	11.83	11.30	10.74	9.16	10.05	10.27	10.34	(8)
Manitoba	13.00	11.79	12.12	11.13	10.49	11.14	11.75	10.97	(7)
Quebec	13.87	14.12	14.44	14.87	13.98	12.95	12.49	12.02	(4)
New Brunswick	14.12	13.90	13.41	13.31	13.01	13.26	12.78	12.58	(3)
Nova Scotia	15.76	15.14	14.24	14.39	14.26	14.24	14.15	13.68	(1)
Prince Edward Island	12.76	11.68	12.22	11.38	11.23	11.49	10.83	11.00	(6)
Newfoundland	15.26	15.24	15.21	14.85	14.33	14.16	13.77	13.01	(2)
9 Provinces	13.22	13.03	12.77	12.57	11.89	11.69	11.46	11.05	-
Ontario (Rank)	10.01 (10)	9.47 (10)	8.87 (10)	8.44 (10)	7.94 (10)	8.18 (10)	8.05 (10)	7.89 -	- (10)
Canada	11.96	11.64	11.25	10.98	10.38	10.34	10.14	9.81	-

e = estimate

Source: Tripartite Committee on Interprovincial Comparisons, April 1986, for actual data. COU Research Division for estimates.

Figure 5
GROWTH OF GRANTS TO UNIVERSITIES RELATIVE TO GDP
1977–78 to 1984–85

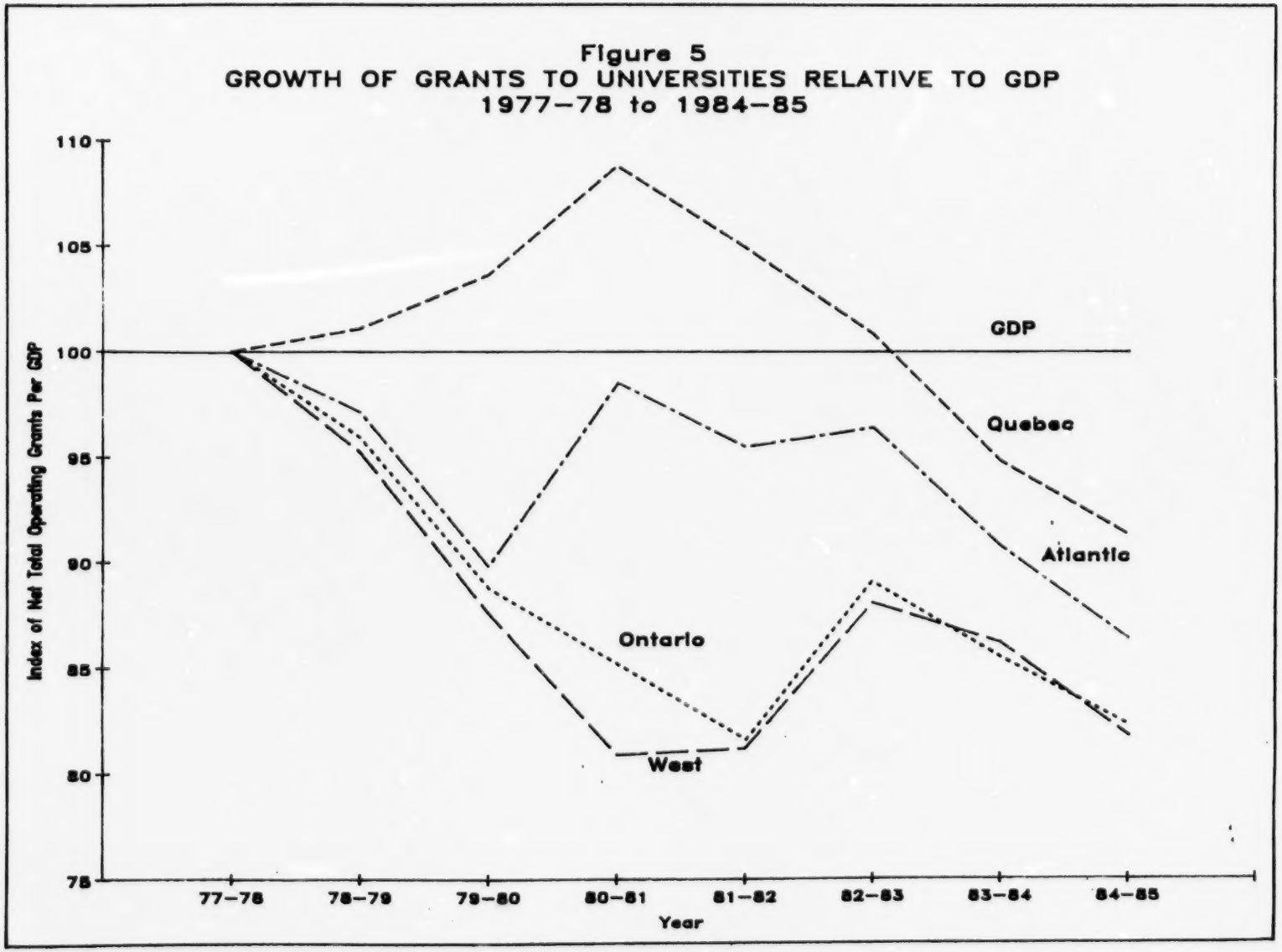


Table 7

GDP Elasticity By Province, 1977-78 to 1984-85

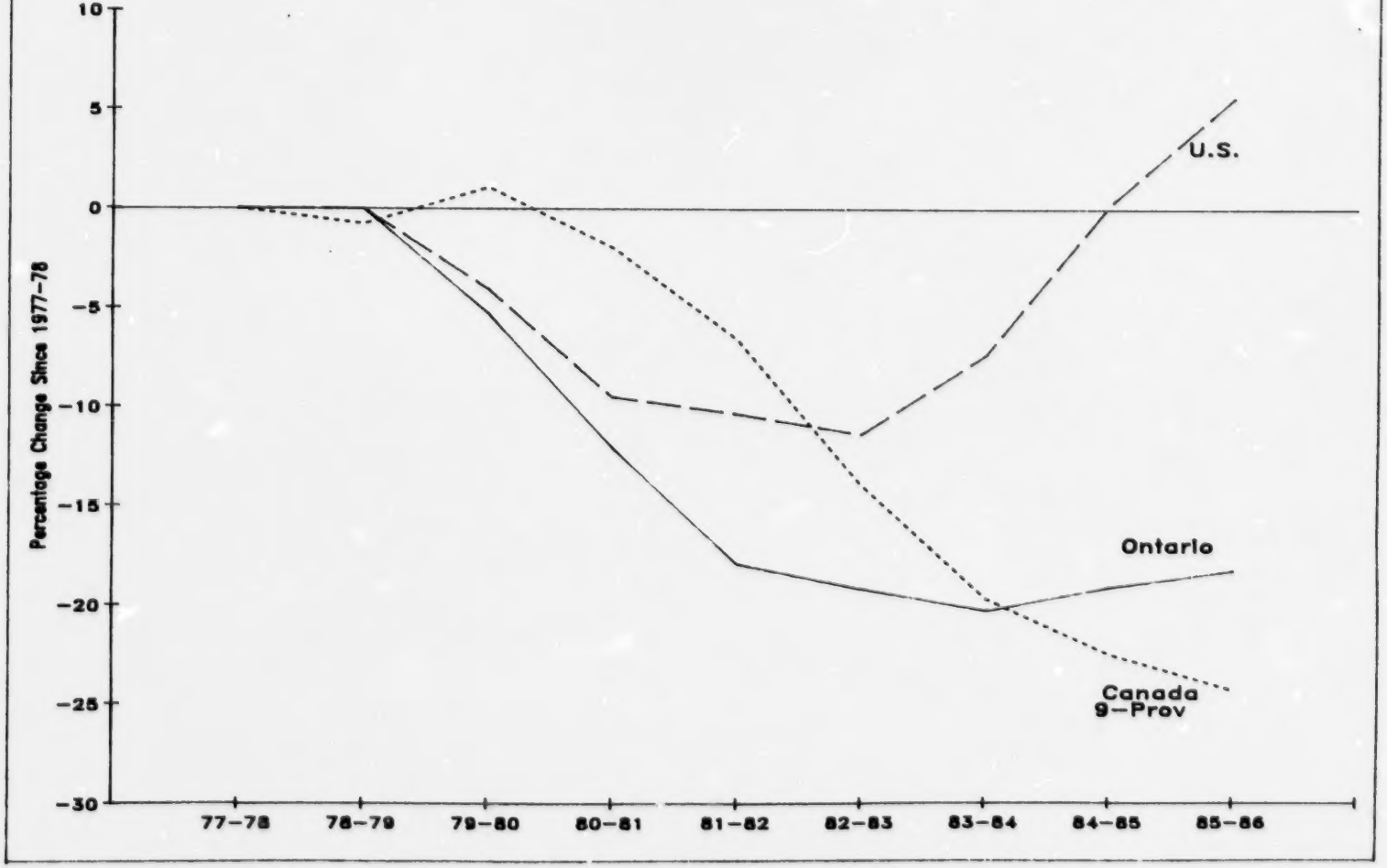
(Growth Rates of Provincial Operating Grants to Universities as a Ratio of GDP Growth)

	1977-78 to 1981-82	1981-82 to 1984-85	1977-78 to 1984-85	Rank
British Columbia	0.753	0.033	0.555	(10)
Alberta	0.497	1.172	0.706	(7)
Saskatchewan	0.531	1.301	0.721	(6)
Manitoba	0.526	1.099	0.768	(3)
Quebec	1.132	0.296	0.819	(1)
New Brunswick	0.914	0.683	0.788	(2)
Nova Scotia	0.940	0.618	0.757	(4)
Prince Edward Island	0.622	0.911	0.737	(5)
Newfoundland	0.773	0.467	0.635	(9)
9 - Provinces	0.792	0.595	0.723	--
Ontario	0.501	0.845	0.648	(8)
Canada	0.715	0.678	0.701	--

Note: In this table, "elasticity" refers to the growth of operating grants to universities relative to the growth of the economy. The table demonstrates that as the economy, stated in terms of Gross Domestic Product, expands or contracts, then operating grants to universities will expand or contract at a ratio greater or lesser than 1.00. That is, if provincial grants to universities are increasing at a faster rate than the GDP, this table will reflect elasticities greater than 1.00.

Sources: Statistics Canada
Tripartite Committee on Interprovincial Comparisons

Figure 6
GROWTH IN STATE & PROVINCIAL GRANTS PER FTE ENROLMENT
1977–78 to 1985–86
(CONSTANT DOLLARS)



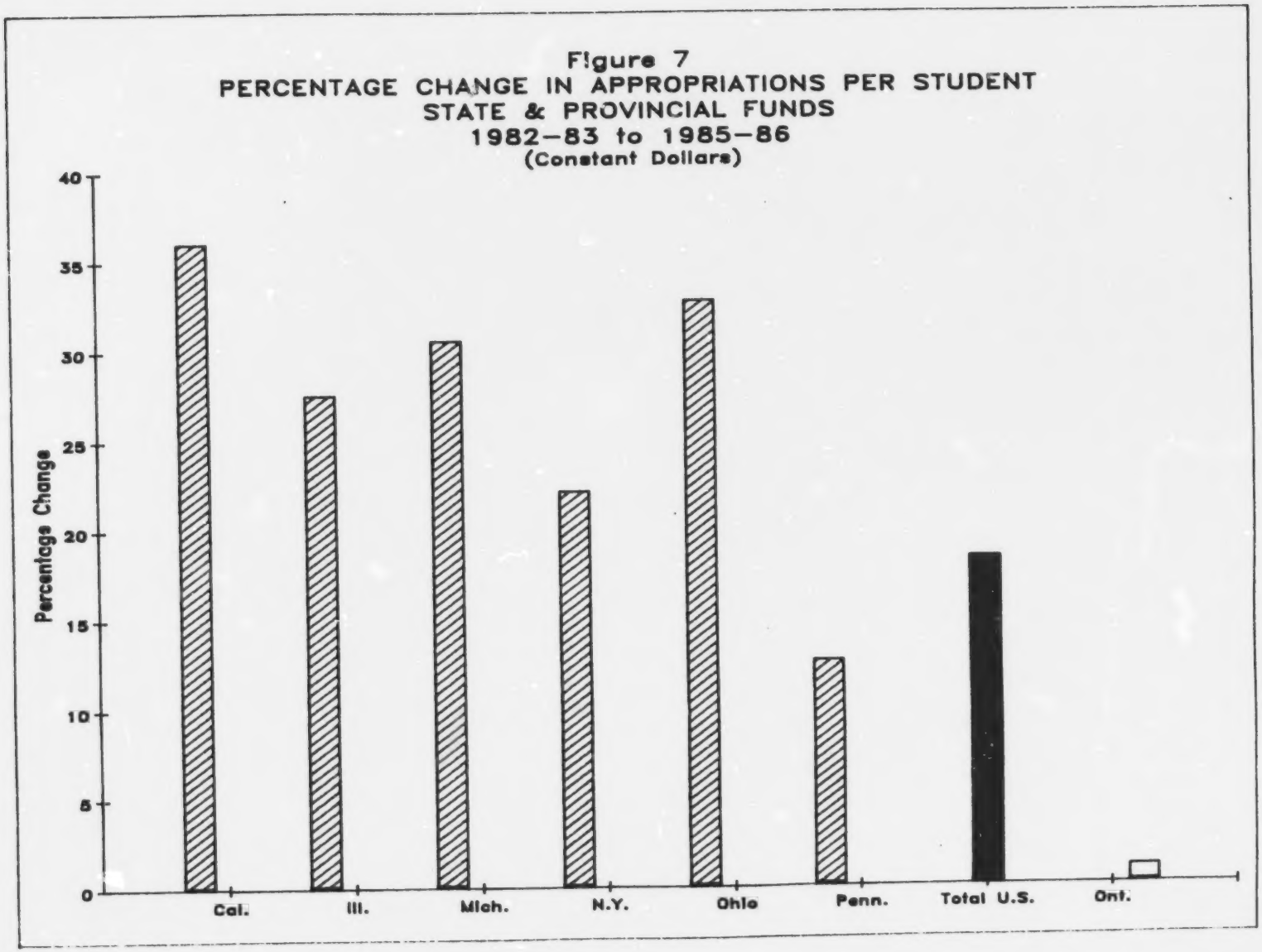


Figure 7
PERCENTAGE CHANGE IN APPROPRIATIONS PER STUDENT
STATE & PROVINCIAL FUNDS
1982–83 to 1985–86
(Constant Dollars)
Percentage Change
40
35
30
25
20
15
10
5
0
Cal.
Ill.
Mich.
N.Y.
Ohio
Penn.
Total U.S.
Ont.

Table 8

Percentage of Universities' General Operating Income, 1984-85

	Provincial Government Grants		Tuition Fees Credit Courses		Other Operating Income		Total Operating Income
	%	Rank	%	Rank	%	Rank	%
British Columbia	81.0	(6)	14.6	(5)	4.4	(7)	100.0
Alberta	84.7	(2)	10.1	(9)	5.2	(1)	100.0
Saskatchewan	82.6	(4)	12.7	(7)	4.8	(5)	100.0
Manitoba	82.1	(5)	13.0	(6)	4.7	(6)	100.0
Quebec	87.6	(1)	8.0	(10)	4.4	(8)	100.0
New Brunswick	77.8	(7)	18.4	(2)	3.8	(9)	100.0
Prince Edward Island	76.9	(8)	18.3	(3)	4.8	(4)	100.0
Nova Scotia	73.6	(10)	17.9	(4)	8.5	(1)	100.0
Newfoundland	84.4	(3)	11.9	(8)	3.7	(10)	100.0
9 Provinces	83.7	-	11.4	-	4.9	-	100.0
Ontario	75.8	(9)	18.4	(1)	5.8	(2)	100.0
Canada	80.7%		14.1%		5.2%		100.0%

Source: Canadian Association of University Business Officers, Financial Statistics of Universities and Colleges 1984-85

Table 9

Percentage of Universities' Total Income, 1984-85

	Provincial Government Grants		Total Fees		Other Income		Total Income
	%	Rank	%	Rank	%	Rank	%
British Columbia	59.5	(8)	12.3	(5)	28.2	(3)	100.0
Alberta	69.7	(3)	7.3	(9)	23.0	(7)	100.0
Saskatchewan	64.6	(5)	9.6	(8)	25.8	(5)	100.0
Manitoba	64.7	(4)	9.7	(7)	25.6	(6)	100.0
Quebec	70.2	(1)	7.2	(10)	22.6	(8)	100.0
New Brunswick	59.7	(7)	14.2	(3)	26.1	(4)	100.0
Prince Edward Island	63.4	(6)	15.1	(1)	21.5	(9)	100.0
Nova Scotia	52.7	(10)	14.0	(4)	33.3	(1)	100.0
Newfoundland	69.8	(2)	10.5	(6)	19.7	(10)	100.0
9 Provinces	66.0	-	9.2	-	24.8	-	100.0
Ontario	55.1	(9)	14.4	(2)	30.5	(2)	100.0
Canada	61.9%		11.2%		26.9%		100.0%

Source: Canadian Association of University Business Officers, Financial Statistics of Universities and Colleges 1984-85

Table 10

Costs of Sponsored Research and the Operating Base

1977-78 to 1985-86

	Sponsored Research Expenses		Operating Expenses	
	Constant Dollars (1977-78)	Percentage Growth from 1977-78	Constant Dollars (1977-78)	Percentage Growth from 1977-78
1977-78	$125,627	-	$868,333	-
1978-79	132,419	+5.4%	835,730	-3.7%
1979-80	136,204	+8.4	808,029	-6.9
1980-81	141,174	+12.4	788,325	-9.2
1981-82	154,531	+23.0	789,451	-9.1
1982-83	170,899	+36.0	816,769	-5.9
1983-84	173,877	+38.4	845,265	-2.6
1984-85	185,871	+48.0	856,732	-1.3
1985-86	189,024	+50.5	879,766	+1.3

Source: COFO-UO

Table 11

Salaries and Wages, Ontario Universities, 1977-78 to 1985-86
(1977-78 $ constant)

	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86
Academic Ranks									
Constant Dollars ($000)	$340,465	$328,527	$317,209	$309,829	$309,579	$320,583	$325,807	$328,848	$334,356
Constant Dollars Per FTE Enrolment	100.0	96.3	92.4	87.2	83.1	81.5	80.3	80.6	82.6
Other Instruction and Research									
Constant Dollars ($000)	$38,248	$35,519	$34,742	$34,451	$33,448	$33,441	$33,542	$33,806	$34,892
Constant Dollars Per FTE Enrolment	100.0	92.7	90.1	86.3	79.9	75.7	73.6	73.7	76.7
Non-Academic Staff									
Constant Dollars ($000)	$250,779	$240,317	$226,186	$218,856	$219,392	$226,513	$236,889	$240,495	$248,165
Constant Dollars Per FTE Enrolment	100.0	95.7	89.4	83.7	80.0	78.2	79.2	80.0	83.2
Total Salaries and Wages									
Constant Dollars ($000)	$629,492	$604,363	$578,137	$563,136	$562,419	$580,537	$596,238	$603,150	$617,413
Constant Dollars Per FTE Enrolment	100.0	95.9	91.1	85.7	81.7	79.9	79.4	79.9	82.5

Source: COFO-UO

Table 12

Comparison of Benefit Costs

1977-78 to 1986-87

($000 Constant 1977-78 Dollars)

(excluding OCA, Algoma, Nipissing, Hearst)

	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86	1986-87e
Statutory Benefits										
O.H.I.P.	5,821	6,098	5,423	4,646	4,736	5,368	5,316	5,469	5,355	5,401
Canada Pension	5,906	5,768	5,644	5,578	5,549	5,864	5,987	6,252	6,608	6,996
Worker's Compensation	948	846	826	776	927	1,058	1,102	1,288	1,504	1,789
Unemployment Insurance	7,250	6,605	5,504	6,356	7,649	8,831	11,307	11,843	12,431	13,034
Total Statutory Benefits	19,925	19,318	17,397	17,365	18,861	21,120	23,712	24,851	25,898	27,220
Non-Statutory Benefits										
Pension										
- Current Service	36,003	35,681	34,838	33,365	33,946	36,010	37,169	36,996	37,974	37,913
- Experience Deficiency	1,513	1,660	415	138	262	260	188	174	(103)	(104)
- Past Service Liability	3,466	3,251	2,038	654	99	327	410	518	0	0
Group Life Insurance	3,837	3,463	3,294	2,981	2,622	2,811	2,897	2,720	2,830	2,972
Long Term Disability	1,805	1,874	1,843	2,292	2,179	2,439	2,709	2,654	2,758	2,794
Dental Insurance	1,222	1,939	1,925	2,245	2,920	3,310	3,437	3,757	4,287	4,723
Extended Health Care	1,079	941	898	1,253	1,396	1,751	2,090	2,399	2,791	3,115
Tuition Remission	479	879	1,420	1,437	1,770	1,802	1,974	2,299	2,342	2,380
Other	485	434	518	495	654	618	435	244	728	888
Total Non-Statutory Benefits	49,890	50,123	47,189	44,860	45,848	49,327	51,311	51,761	53,608	54,681
Total Benefits	69,815	69,441	64,586	62,216	64,709	70,447	75,022	76,612	79,506	81,901

Figure 8
ONTARIO GOVERNMENT AND UNIVERSITIES'
CONTRIBUTORY BENEFITS AS A PERCENTAGE OF SALARIES
1977–78 to 1985–86

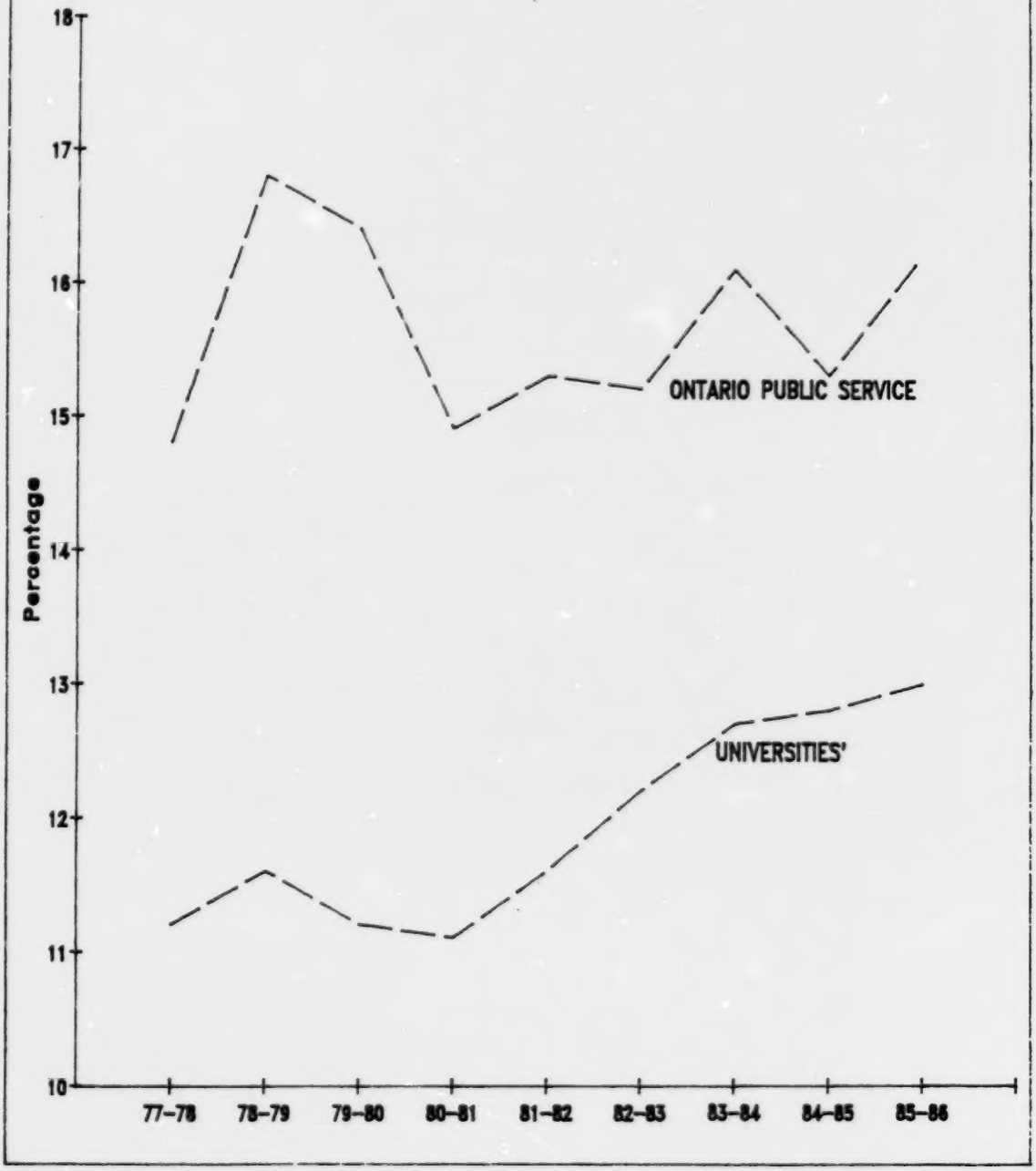


Table 13

Ontario University Non Salary Price Index

(1986 revision: 1980-81 = 100)

Year	OUNSPI	CPI	OUNSPI Annual % Increase	CPI Annual % Increase
Actual				
1970-71	37.8	44.7	-	-
1971-72	39.5	46.4	4.4	3.9
1972-73	40.8	48.8	3.4	5.1
1973-74	45.4	53.1	11.1	8.9
1974-75	52.9	59.2	16.6	11.4
1975-76	58.6	65.1	10.9	10.0
1976-77	63.9	69.5	8.9	6.8
1977-78	71.8	75.5	12.3	8.6
1978-79	78.8	82.4	9.9	9.1
1979-80	89.1	90.0	13.1	9.2
1980-81	100.0	100.0	12.2	11.2
1981-82	113.9	112.2	13.9	12.2
1982-83	125.4	122.7	10.0	9.4
1983-84	131.0	129.0	4.5	5.1
1984-85	139.4	134.0	6.4	3.9
1985-86	146.9	139.5	5.4	4.1
Estimated				
1986-87	153.4	144.6	4.5	3.7
1987-88	159.9	149.7	4.2	3.5
1988-89	167.0	155.2	4.5	3.7
1989-90	174.7	161.1	4.6	3.8
1990-91	182.4	167.1	4.5	3.7

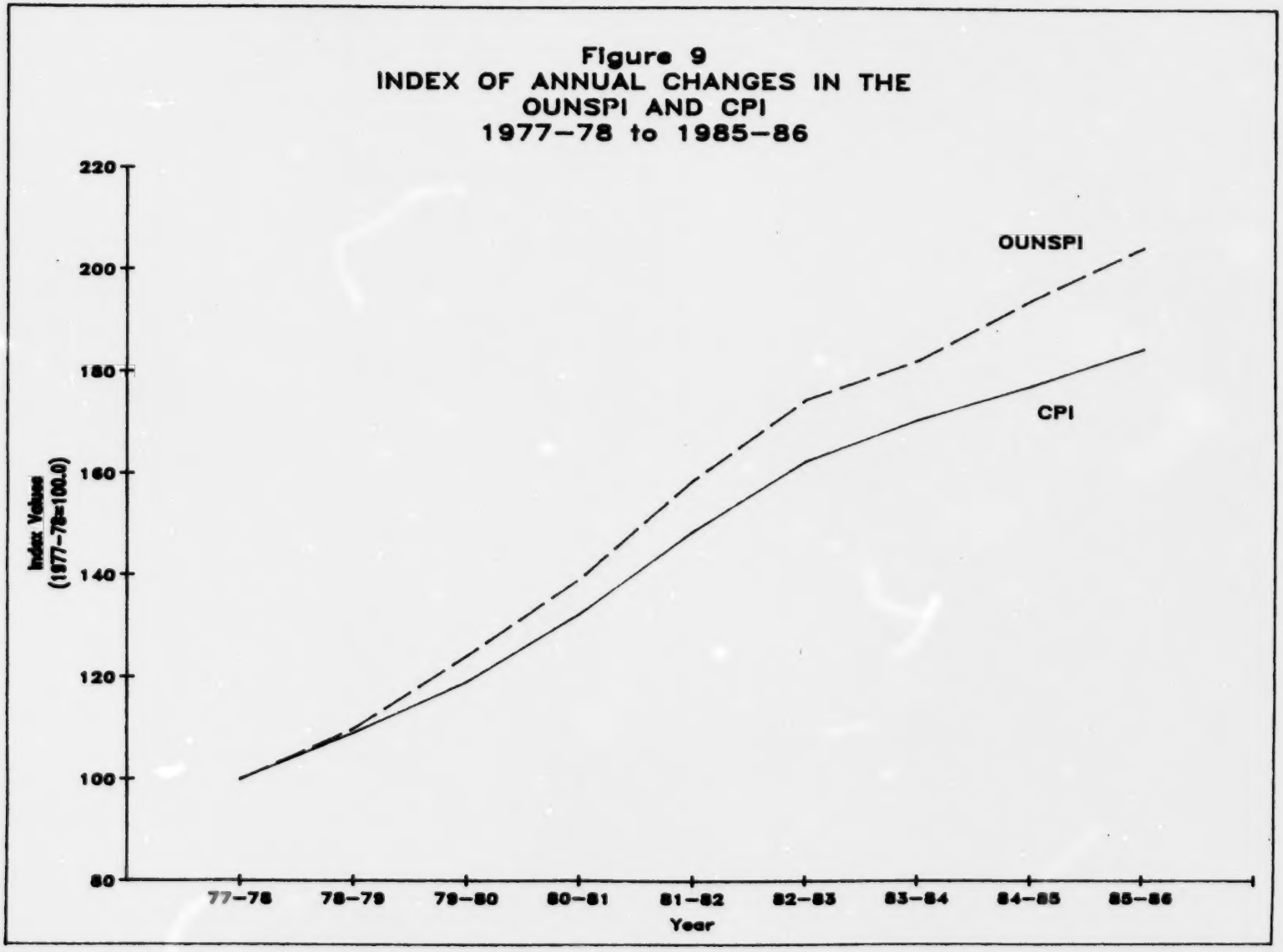


Figure 9
INDEX OF ANNUAL CHANGES IN THE
OUNSPI AND CPI
1977–78 to 1985–86
220
200
180
160
140
120
100
80
Index Values
(1977–78=100.0)
OUNSPI
CPI
77–78
78–79
79–80
80–81
81–82
82–83
83–84
84–85
85–86
Year

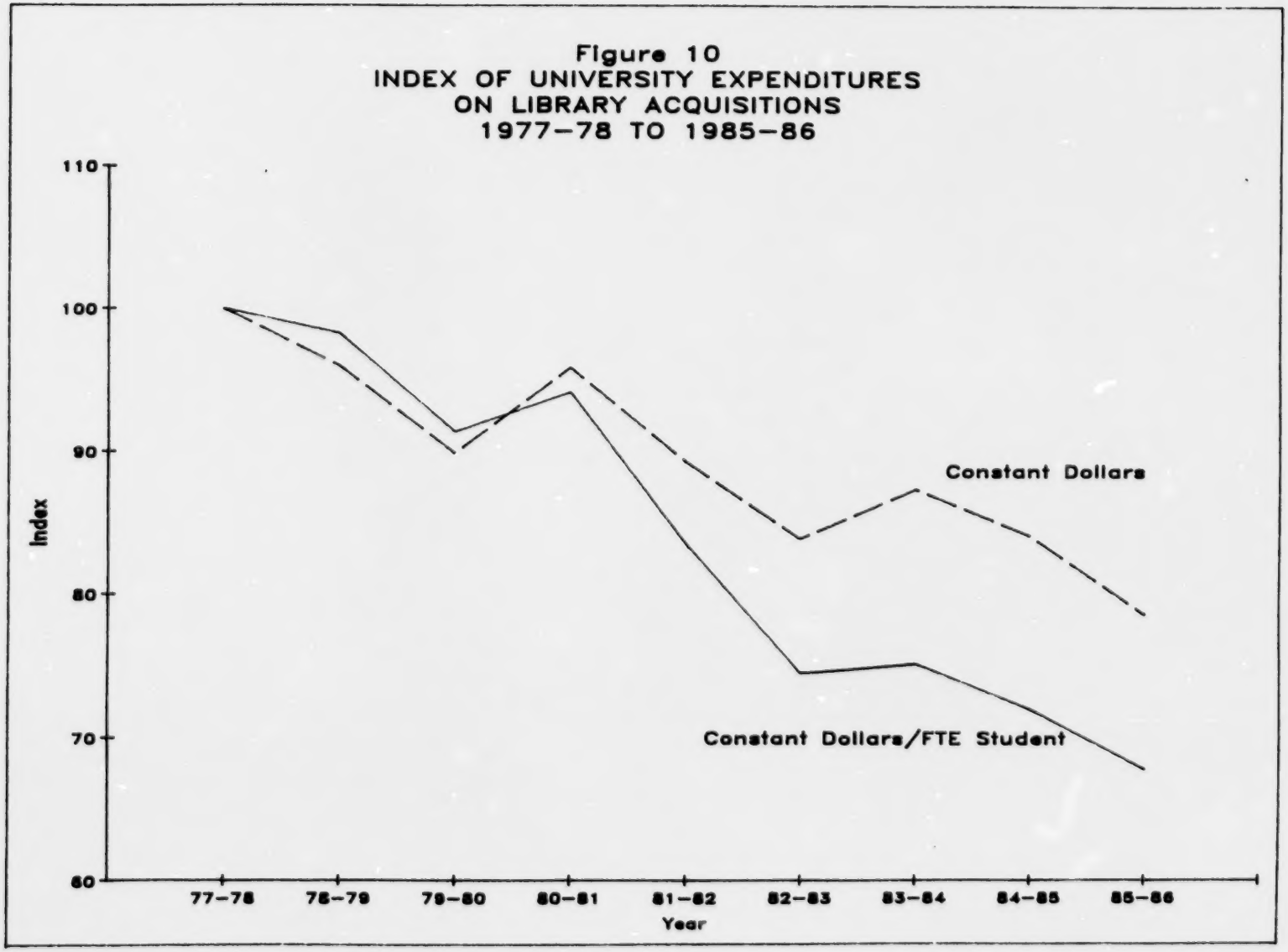


Figure 10
INDEX OF UNIVERSITY EXPENDITURES
ON LIBRARY ACQUISITIONS
1977–78 TO 1985–86
110
100
90
80
70
60
Index
Constant Dollars
Constant Dollars/FTE Student
77–78
78–79
79–80
80–81
81–82
82–83
83–84
84–85
85–86
Year

Table 14

Index of Expenditure on Library Acquisitions

	Acquisitions as % of Total Operating Expenses	Constant Dollars	Constant Dollars per FTE	Cost Index
1977-78	2.0	100.0	100.0	100.0
1978-79	2.1	96.0	98.3	115.4
1979-80	2.2	89.9	91.4	136.5
1980-81	2.3	95.9	94.2	148.0
1981-82	2.2	89.3	83.6	168.8
1982-83	2.1	83.9	74.5	198.1
1983-84	2.2	87.4	75.2	214.3
1984-85	2.2	84.1	72.0	236.7
1985-86	2.2	78.6	67.8	263.8

Source: COFO-UO Financial Report of Ontario Universities, various years.
Bowker (U.S.) Hardcover Book and Periodical.
Price indices converted for Canadian dollar fluctuations.

Figure 11
CAPITAL FUNDING FOR UNIVERSITIES, RYERSON AND OCA
IN ACTUAL & CONSTANT 86–87 DOLLARS
1964–65 to 1986–87

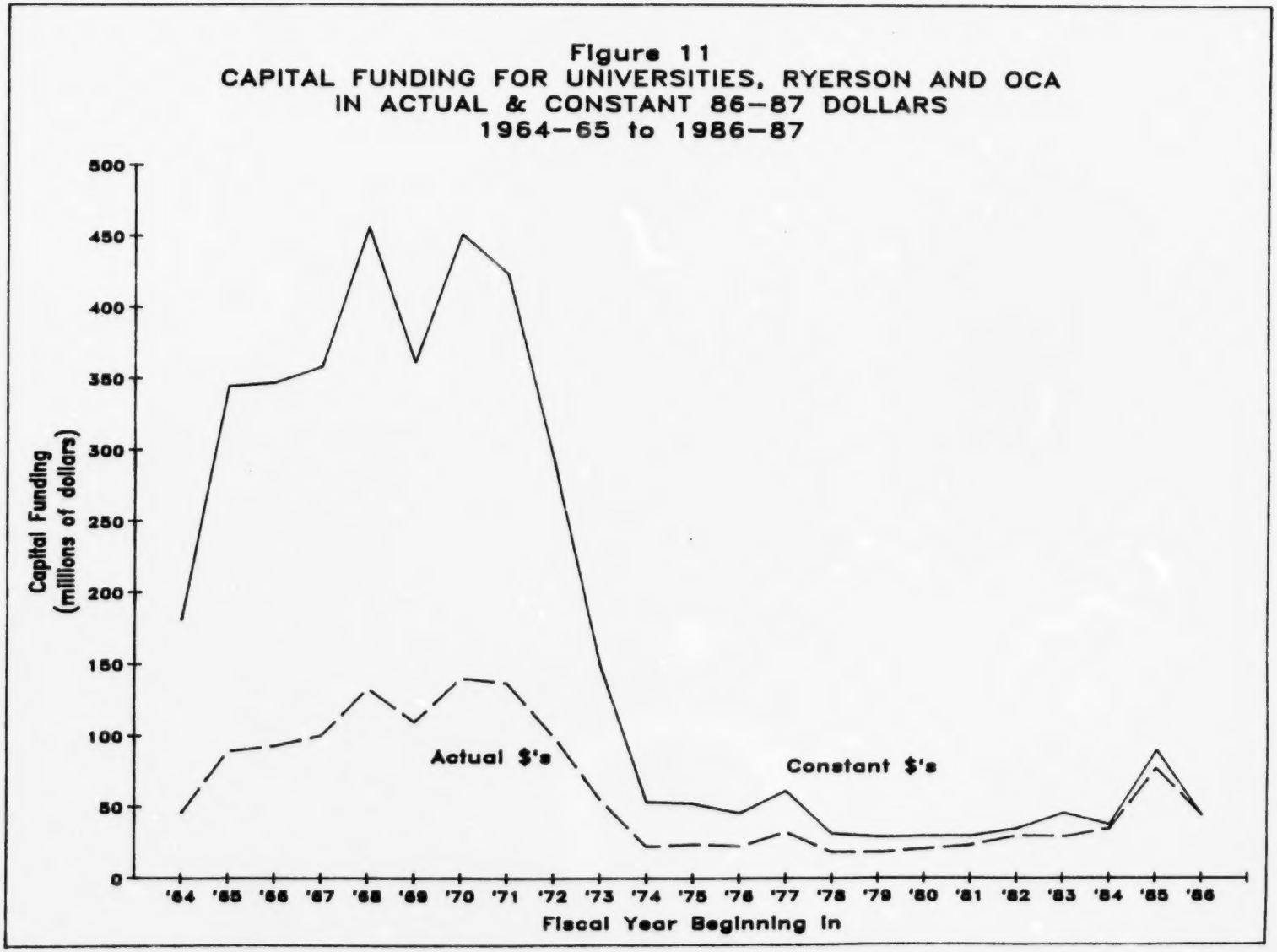


Table 15

Capital Funding for Universities, Ryerson, OCA
1964-65 to 1986-87

	Capital Funding ($000)	Constant 1986-87 dollars ($000)
1964-65	45,600.0	181,423.8
1965-66	89,239.0	344,800.3
1966-67	93,105.0	347,342.9
1967-68	99,995.0	358,594.8
1968-69	132,974.0	456,469.8
1969-70	109,253.0	361,499.4
1970-71	139,805.0	451,602.0
1971-72	136,047.0	423,246.5
1972-73	98,712.0	292,090.4
1973-74	54,492.0	148,185.4
1974-75	21,642.0	52,788.9
1975-76	23,339.2	51,769.3
1976-77	21,704.7	45,095.8
1977-78	31,889.6	60,991.5
1978-79	17,498.4	30,664.7
1979-80	17,740.5	28,463.6
1980-81	20,387.0	29,438.8
1981-82	22,891.7	29,461.3
1982-83	29,620.3	34,858.8
1983-84	28,960.0	32,417.2
1984-85	34,742.6	37,439.0
1985-86	77,076.4	79,955.7
1986-87	44,027.5	44,027.5

Table 16

Buildings, Land and Site Services
Total Expenses By Province

1984-85

	University Buildings, Land, and Site Services ($000)	Building Expenses Per Estimated FTE Enrolment $	Index	Rank
British Columbia	$31,021	$761.27	244.1	(2)
Alberta	42,904	923.64	296.2	(1)
Saskatchewan	12,240	552.37	177.1	(4)
Manitoba	13,981	561.55	180.1	(3)
Quebec	35,520	254.10	81.5	(5)
New Brunswick	2,903	183.80	58.9	(7)
P.E.I.	355	185.19	59.4	(6)
Nova Scotia	2,241	89.89	28.8	(10)
Newfoundland	1,619	157.09	50.4	(8)
9-provinces	142,794	436.66	140.0	-
Ontario	25,553	120.09	38.5	(9)
CANADA 10-provinces	$168,337	$311.86	100.0	-

Source: CAUBO
Statistics Canada

Table 17

Estimated Gross General Provincial Government Revenue Per Capita

and as a Percentage of Gross Domestic Product and Provincial Personal Income

1984-85

	Gross Domestic Product ($000,000's)	Gross General Revenue %	(Rank)	Provincial Personal Income ($000,000's)	Gross General Revenue %	(Rank)	Gross General Revenue Per Capita $	Index (Canada = 100.0)	(Rank)
British Columbia	49,974	18.9	(9)	42,318	22.3	(9)	$3,299	91.0	(8)
Alberta	60,007	22.2	(6)	35,995	37.0	(2)	5,692	157.0	(1)
Saskatchewan	17,417	21.5	(7)	11,123	28.5	(6)	3,706	102.2	(3)
Manitoba	16,636	21.4	(8)	14,540	24.5	(8)	3,359	92.7	(7)
Quebec	97,631	27.6	(4)	88,218	30.6	(5)	4,120	113.7	(2)
New Brunswick	8,074	30.5	(3)	7,664	32.1	(4)	3,447	95.1	(6)
Nova Scotia	10,444	27.4	(5)	10,196	28.1	(7)	3,284	90.6	(9)
Prince Edward Island	1,229	37.5	(1)	1,299	35.5	(3)	3,671	101.3	(4)
Newfoundland	5,995	35.2	(2)	5,618	37.6	(1)	3,646	100.6	(5)
9 Provinces Outside Ontario	267,427	24.3%	-	218,991	29.7%	-	4,031	111.2	-
Ontario	167,741	15.4	(10)	141,730	18.3	(10)	2,893	79.8	(10)
Canada	435,168	20.9%	-	360,721	25.2%	-	3,624	100.0	-

Source: Statistics Canada.

Table 18

Local/Provincial Government "Own Source" Revenue as a Percentage of Gross Domestic Product, 1982-83

	Gross Domestic Product ($ millions)	Local/Provincial "Own Source" Revenue ($ millions)	"Own Source" Revenue as % of GDP	RANK
British Columbia	44,459	8,773.0	19.7	(7)
Alberta	52,844	14,285.5	27.0	(1)
Saskatchewan	15,408	3,371.9	21.9	(3)
Manitoba	13,983	2,758.4	19.7	(8)
Quebec	84,009	21,566.4	25.7	(2)
New Brunswick	6,383	1,201.9	18.8	(9)
Nova Scotia	8,394	1,704.3	20.3	(6)
Prince Edward Island	1,039	214.1	20.6	(4)
Newfoundland	4,945	1,011.5	20.5	(5)
9 Provinces	231,464	54,886.9	23.7	
Ontario	137,232	25,645.7	18.7	(10)
Canada	368,696	80,532.6	21.8	

Source: Statistics Canada

Table 19

Estimated Tax Capacity, Tax Revenue and Tax Effort

1986-87

	Estimated Tax Capacity Per Capita	Estimated Tax Revenue Per Capita	Estimated Tax Effort Per Capita	Estimated Tax Effort Adjusted for Surplus/Deficit
British Columbia	101.3	96.8	95.6	96.4
Alberta	157.2	139.3	88.6	97.7
Saskatchewan	98.5	107.0	108.6	114.7
Manitoba	85.5	89.0	104.2	112.5
Ontario	102.6	87.2	85.0	84.3
Quebec	86.4	116.8	135.2	126.0
New Brunswick	75.3	69.5	92.3	94.2
Prince Edward Island	70.3	65.7	93.4	91.0
Nova Scotia	80.5	65.8	81.7	90.5
Newfoundland	69.3	69.7	100.6	102.5
10 Provinces	100.0	100.0	100.0	100.0

Note: Tax capacity uses a representative tax system, consisting of the various taxes imposed by provincial governments, to reflect the resources which a government can tax to raise revenue for public purposes. Tax revenue is the relative amount per capita actually raised by provincial governments, (it excludes all federal transfers and local property taxes but includes provincial revenues from natural resources and an estimate of miscellaneous revenue not normally included in federal calculations in regard to equalization payments). Tax effort measures the extent to which a government is actually cultivating the resources available for taxation. Adjusting tax effort, for surpluses and deficits, treats borrowings (where there is a deficit) as a form of revenue and surpluses as a loss of revenues which would otherwise be available for spending.

Sources: Canada Department of Finance, Federal-Provincial Relations Division, Statistics Canada.

Table 20

Capital Expenditures and Borrowings

Province of Ontario, 1977-78 to 1986-1987

($ millions)

Year	Net Borrowings (1)	Net Cash Requirements (2)	Increase (Decrease) in Liquid Reserves (1) - (2) = (3)	Capital Expenditures (4)	Operating Funds Surplus (Deficit) (4) - (2) = (5) (3+4) - (1) = (5)
1977-78	1,506	1,762	(256)	1,536	(226)
1978-79	1,652	1,180	472	1,361	181
1979-80	1,132	584	548	1,561	977
1980-81	968	803	165	1,709	906
1981-82	1,363	1,503	(140)	2,311	808
1982-83	2,051	2,478	(427)	2,306	(172)
1983-84	2,860	2,289	571	2,244	(45)
1984-85	2,090	1,702	388	2,259	557
1985-86	2,102	2,110*	(8)	2,222	112
1986-87 (outlook)	1,331	1,349	(18)	2,471	1,122

Notes:
(1) Proceeds of Loans minus Retirement of Loans.
(2) Expenditures minus Revenues plus or minus net Non-Budgetary Transactions.
(3) Cash, temporary investments and marketable securities. The balance at the end of 1985-86 was $2.1 billion.
(4) Physical assets, buildings and land make up the bulk of this amount.
(5) Capital expenditures minus net cash requirements equals the surplus or deficit on current, operating expenditures. It is composed of the increase or decrease in liquid reserves plus capital investments and minus net borrowings.

*Includes Extraordinary Adjustments (net) of $505 million.

The above Table separates funds raised for operating purposes and funds raised for capital purposes. As shown in column 5, in seven of the current and previous ten years, all operating fund requirements were met by taxation, federal transfers, or other revenue sources (i.e. no borrowed funds were involved). Net borrowings averaged $1.7 billion per year, but in most years were used to increase liquid reserves and to finance capital expenditures. Other capital expenditures were financed out of operating funds.

Source: Ontario Budget, various years.
Public Accounts, various years.
Ontario Finances, Quarterly Update, December 31, 1986

Table 21

Canadian Unemployment and Participation Rates

by Educational Attainment

(Seasonally Unadjusted)

	Unemployment Rates*										Participation** Rates
	1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1986
Total Canadian Labour Force	8.3%	7.9%	7.0%	7.1%	8.5%	12.7%	11.1%	10.7%	9.8%	9.3%	64.6%
0-8 Years	10.5	9.4	9.0	9.0	11.3	15.6	12.6	14.1	12.7	11.9	38.0
High School	9.5	9.0	7.8	8.3	10.0	14.8	13.2	12.5	11.7	11.3	65.9
Some Post-Secondary	6.9	7.0	4.8	6.7	6.6	11.1	11.0	9.4	8.2	7.7	71.1
Post-Secondary Certificate or Diploma	6.0	5.2	5.3	4.0	5.0	8.9	8.3	7.7	7.2	6.4	77.3
University Degree	3.0	3.4	2.8	2.5	3.2	5.9	3.8	4.6	4.4	3.8	84.0

Source: Estimates by Educational Attainment. The Labour Force Monthly Report. Statistics Canada.

* As of December of each year.

** Labour Force percentage of population 15 years and over.

Table 22

University Graduates by Industry of Employment
Breakdown by Sector, 1981, Canada

	Labour Force With University Degree by Industry	Percentage of Labour Force	University Degreed % of Industry Labour Force
PRIMARY			
Farming	13,945	1.1	2.98
Oil, Gas & Coal	13,640	1.1	21.58
Other Primary Industries	7,990	0.6	3.56
Sub-total	35,575	2.8	4.71
MANUFACTURING			
Petroleum & Chemicals	18,930	1.5	14.60
Other Manufacturing	98,595	7.7	4.59
Sub-total	117,525	9.2	5.16
SERVICES			
Construction	22,085	1.7	2.88
Transportation, Communication & Utilities	55,925	4.4	5.82
Wholesale & Retail Trade	89,675	7.0	4.47
Finance, Insurance & Real Estate	70,250	5.5	11.04
Education	385,560	30.0	49.11
Health & Welfare	136,105	10.6	15.54
Business Management	135,700	10.6	27.63
Government Administration	145,770	11.4	16.05
Miscellaneous	89,170	6.9	6.31
Sub-total	1,130,240	88.1	12.78
TOTAL	1,283,340	100.0	10.81

Source: Statistics Canada, 1981 Census

APPENDIX

Appendix

Update of the

Ontario University Non-Salary Price Index

The Ontario University Non-Salary Price Index was developed in 1978 to provide "a more sensitive tool to assist in measuring the likely impact of inflation on non-salary expenditure, and a more accurate measure of the extent of inflationary erosion between any two years."* The OUNSPI measures both component and global price changes for university non-salary expenditure. The components include library acquisitions, equipment and furniture, operational supplies and expenses, utilities, renovations, alterations, and major repairs, externally contracted services, travel, insurance and space rental. In 1984, the OUNSPI was revised to take account of altered patterns of expenditure.

The following tables update both the index values and the price variations to 1984-85:

- Table A-1 provides information on the annual percentage variation of components.
- Table A-2 provides un update of index values for each component based on 1980-81 being equal to 100.0.

Figure A-1 identifies the sources of information for the various components employed in the OUNSPI and indicates the index weights employed for each component in the calculation of the overall, non-salary price index.

*Council of Ontario Universities, Ontario University Non-Salary Price Index, February 1978.

Table A-1

Annual Percentage Variation in the Ontario University Non-Salary Price Index Components

Component	1971-72	1972-73	1973-74	1974-75	1975-76	1976-77	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86
Books	9.9	-3.7	-5.3	13.0	19.5	4.1	19.2	9.5	25.2	3.5	10.8	17.0	3.2	2.5	9.1e
Periodicals	8.3	11.3	23.7	6.9	17.1	9.5	17.8	22.3	11.0	14.5	16.1	17.6	12.5	16.7	13.0
Equipment	1.4	0.4	5.2	19.2	13.1	4.6	16.5	15.0	11.1	12.5	15.3	7.3	2.8	9.1	5.8
Computing	1.9	1.4	1.2	3.4	7.9	0.5	9.1	6.2	5.9	19.8	14.9	1.4	0.4	6.6	12.2
Furniture	5.0	4.7	11.0	14.8	8.5	6.1	4.9	7.0	12.8	10.4	12.3	7.2	4.5	6.7	6.0
Stationery and Paper	1.1	2.0	20.3	33.8	9.0	3.6	5.0	9.9	17.3	14.1	9.0	-0.6	0.9	10.7	-0.5
Printing Materials	1.7	4.5	22.7	23.5	2.2	-0.7	4.2	7.2	14.2	10.0	10.3	2.6	2.7	6.7	0.1
Tools and Apparatus	3.2	2.3	6.8	16.0	10.9	6.5	11.6	10.6	16.7	14.3	11.6	8.3	4.3	5.9	5.0
Chemicals	1.1	1.8	11.0	30.5	10.0	4.2	6.0	8.7	16.7	15.0	12.7	5.0	3.3	2.7	2.1
Postage	12.3	7.6	-	-	0.4	19.3	25.3	17.0	19.6	0.2	24.2	40.9	5.1	0.0	10.7
Long Distance	2.6	4.5	1.9	1.0	3.7	7.4	9.3	5.6	3.5	4.5	11.5	15.1	5.4	1.4	1.1
Electricity	4.9	6.9	8.0	8.2	9.4	28.3	28.3	5.3	10.4	11.7	9.8	9.7	8.3	8.1	6.5
Gas	1.5	0.4	4.9	12.4	25.8	22.1	15.6	14.6	5.5	17.9	26.5	22.0	5.0	1.4	0.0
Oil	11.7	-3.3	54.4	52.1	10.1	18.5	20.8	14.8	26.8	22.4	24.6	7.4	13.7	11.9	-5.1
Telephone	2.6	4.5	1.9	1.0	3.7	7.4	9.3	5.6	3.5	4.5	11.5	15.1	5.4	1.4	1.1
Water	-	-	-	7.7	8.5	12.3	11.7	7.6	7.3	8.3	12.4	11.7	6.7	6.5	6.5
Renovations	4.4	5.2	11.9	19.0	5.5	5.6	6.8	11.1	15.1	9.4	9.7	4.8	4.6	3.3	4.4
Transportation	3.9	1.8	5.0	11.0	12.2	9.2	6.0	6.6	11.4	14.4	18.1	10.7	4.7	3.9	5.0
Shelter	5.3	6.0	6.5	7.7	9.7	10.9	8.5	6.7	5.5	7.6	12.5	11.0	5.7	3.8	3.5
Food Away From Home	4.5	7.6	15.7	18.4	11.9	7.4	5.3	8.7	12.1	8.5	9.9	9.6	4.5	4.0	4.3
Insurance	28.5	20.9	22.4	13.2	26.0	21.2	12.2	5.9	5.8	8.9	20.0	8.4	5.6	2.8	5.4
Space Rental	5.3	6.0	6.5	7.7	9.7	10.9	8.5	6.7	5.5	7.6	12.5	11.0	5.7	3.8	3.5

e = estimated figure

Table A-2

Component Price Indices in the Ontario University Non-Salary Price Index

(Based on the Fiscal Year 1980-81 = 100)

Components	1970-71	1971-72	1972-73	1973-74	1974-75	1975-76	1976-77	1977-78	1978-79	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85	1985-86
Books	42.0	46.1	44.4	42.0	47.5	56.8	59.1	70.5	77.2	96.6	100.0	110.8	129.6	133.8	137.2	149.7
Periodicals	26.7	29.0	32.2	39.8	42.6	49.9	54.6	64.3	78.7	87.4	100.0	116.1	136.5	153.6	179.3	202.7
Equipment	39.6	40.1	40.3	42.4	50.5	57.1	59.7	69.6	80.0	88.9	100.0	115.3	123.7	127.2	138.8	146.9
Computing	58.0	59.1	60.0	60.7	62.7	67.7	68.0	74.2	78.8	83.5	100.0	114.9	116.5	117.0	124.7	139.9
Furniture	44.4	46.6	48.8	54.1	62.1	67.4	71.5	75.0	80.3	90.5	100.0	112.3	120.3	125.7	134.1	142.1
Stationery and Paper	34.5	34.9	35.6	42.8	57.3	62.4	64.7	68.0	74.7	87.6	100.0	109.0	108.4	109.3	121.0	120.4
Printing Materials	43.6	44.4	46.4	56.9	70.3	71.8	71.3	74.2	79.6	90.9	100.0	110.3	113.2	116.2	124.0	124.2
Tools and Apparatus	39.3	40.6	41.5	44.3	51.4	57.1	60.7	67.8	74.9	87.5	100.0	111.6	120.9	126.1	133.5	140.2
Chemicals	37.9	38.3	39.0	43.3	56.4	62.1	64.7	68.6	74.5	86.9	100.0	112.7	118.3	122.2	125.6	128.2
Postage	39.3	44.2	47.5	47.5	47.5	47.7	56.9	71.3	83.4	99.8	100.0	124.2	175.0	183.9	183.9	203.7
Long Distance	65.2	66.9	69.9	71.2	72.0	74.6	80.2	87.6	92.5	95.7	100.0	111.5	128.4	135.3	137.1	138.6
Electricity	32.7	34.3	36.6	39.6	42.8	46.8	60.0	77.0	81.1	89.5	100.0	109.8	120.5	130.5	141.1	150.2
Gas	32.9	33.4	33.5	35.1	39.5	49.7	60.7	70.2	80.4	84.8	100.0	126.5	154.3	162.0	164.3	164.3
Oil	14.0	15.7	15.2	23.4	35.6	39.2	46.5	56.2	64.5	81.7	100.0	124.6	133.8	152.2	170.3	161.7
Telephone	65.2	66.9	69.9	71.2	72.0	74.6	80.2	87.6	92.5	95.7	100.0	111.5	128.4	135.3	137.1	138.6
Water	54.5	54.5	54.5	54.5	58.7	63.7	71.6	80.0	86.0	92.3	100.0	112.4	125.5	134.0	142.8	152.1
Renovations	41.1	42.9	45.1	50.5	60.0	63.4	66.9	71.5	79.4	91.4	100.0	109.7	115.0	120.2	124.2	129.6
Transportation	46.0	47.7	48.6	51.1	56.7	63.6	69.5	73.7	78.5	87.4	100.0	118.1	130.7	136.7	142.1	149.2
Shelter	48.9	51.4	54.5	58.1	62.6	68.6	76.1	82.6	88.1	93.0	100.0	112.5	124.8	131.9	136.9	141.7
Food Away From Home	38.8	40.5	43.6	50.4	59.7	66.8	71.8	75.6	82.2	92.1	100.0	109.9	120.4	125.8	130.9	136.5
Insurance	22.2	28.6	34.5	42.3	47.8	60.3	73.0	82.0	86.8	91.9	100.0	120.0	130.1	137.3	141.2	148.8
Space Rental	48.9	51.4	54.5	58.1	62.6	68.6	76.1	82.6	88.1	93.0	100.0	112.5	124.8	131.9	136.9	141.7

e = estimated figure.

Figure A-1

Source and Weighting Pattern of Component Indices

Component	Index Weight	Source
Books	7	Bowker (U.S.) Hardcover Book Price Index, converted for Canadian dollar fluctuations
Periodicals	7	Bowker (U.S.) Periodical Price Index, converted for Canadian dollar fluctuations
Equipment	10	U.S. Department of Commerce. Survey of Current Business. Price index for machinery and equipment, converted for Canadian dollar fluctuations
Computing	10	Research Associates of Washington. Higher Education Prices and Price Indexes: 1986 Update. Data processing hardware. Converted for Canadian dollar fluctuations
Furniture	2	Statistics Canada Industrial Product Price Index - Office Furniture Industries
Stationery and Paper	8	Statistics Canada Industrial Product Price Index - Paper and Allied Product Industries
Printing Materials	7	Statistics Canada Industrial Product Price Index - Fine Papers
Tools and Apparatus	8	Statistics Canada Industrial Product Price Index - Hardware, Tool and Cutlery Industries
Chemicals	4	Statistics Canada Industrial Product Price Index - Chemical & Chemical Products Industries
Postage	3	Statistics Canada Consumer Price Index - Postage
Long Distance	2	Statistics Canada Consumer Price Index - Communications
Electricity	9	Statistics Canada Industry Selling Price Index - Electric Power Selling Price Index (Non-Residential) over 5,000 KW - Ontario
Gas	7	Statistics Canada Consumer Price Index - Piped and Bottled Gas
Oil	1	Statistics Canada Industrial Product Price Index - Heavy Fuel Oil
Telephone	4	Statistics Canada Consumer Price Index - Communications
Water	1	Statistics Canada Consumer Price Index - Water
Renovations	3	Statistics Canada Construction Building Material Price Index - Non-Residential
Transportation	3	Statistics Canada Consumer Price Index - Transportation
Shelter	1	Statistics Canada Consumer Price Index - Shelter
Food Away From Home	1	Statistics Canada Consumer Price Index - Food Purchased From Restaurants
Insurance	1	Statistics Canada Consumer Price Index - Homeowner's Insurance Premiums
Space Rental	1	Statistics Canada Consumer Price Index - Shelter